

Serial No. 10/525,852

AMENDMENT TO THE DRAWINGS

The attached twenty sheets of replacement drawings including FIGS. 1-21, replace the original twenty sheets including FIGS. 1-21.

Attachment: Replacement Sheets

REMARKS

Applicants respectfully request reconsideration of this Patent Application, particularly in view of the above Amendment and the following remarks. No additional fee is required for this timely filed Amendment as the number of independent claims has not changed, and the total number of claims has not changed.

Amendment to the Specification

The Specification has been amended to add the required headers, remove the reference to Claim 1 on page 1, and substitute the reference to Claim 1 on page 3 with text from Claim 1. No new matter has been added.

Amendment to the Claims

Claim 1 has been amended to include limitations from dependent Claim 5, which has been canceled. Claims 21, 22, 25-27, 36, 39, 42, and 48 have been amended to respond to the Office Action's comments, to provide proper antecedent bases for claim limitations, and/or for general clarity. Claim 52 has been added, and finds support at page 9, paragraphs 2-4. No new matter has been added to the claims by this Amendment.

Declaration

Enclosed is a new declaration, as required by the Office Action.

Specification

Applicants have added the required headers and removed the references to claim numbers, thereby rendering the objections to the Specification moot.

Drawings

The typographical error on page 14 has been corrected to provide consistent use of the hinge ring reference characters.

Both arrows designated with reference character "20" in Figure 7 are directed to the same part, namely the "natural direction of flexion and extension," as indicated at page 11, line 9, of Applicants' Specification. Therefore, no correction is needed.

Regarding the use of letters in the drawings, there is no requirement that only numbers be used in drawings, and letters are quite common in patent drawings. The letter "F" is also quite commonly used to indicate force. Therefore, no correction is needed.

Replacement drawings are herewith submitted in response to the general objection for illegible reference characters.

Claim Objections

Claims 13, 26, 27, and 42 have been identified or amended as suggested, thereby rendering the claim objections moot.

Claim Rejections - 35 U.S.C. §112

The rejections of Claims 22, 25, 36, 39, and 48 under 35 U.S.C. §112, are rendered moot by the above Amendment.

Claim Rejections - 35 U.S.C. §102

The rejection of Claims 1, 3-5, 15, 17, 20, 21, 23-26, 29-31, 37, 49, and 51 under 35 U.S.C. §102(b) as anticipated by Wilms, U.S. Patent 1,213,786, is respectfully traversed.

Amended Claim 1 recites a flexible splint which is held by the fastening provisions in the regions of the big toe and the central foot and which extends along an inner side of the foot. The flexible splint is formed as a hinged flexible splint, articulated in a direction of flexion and extension of a toe or toes requiring correction, and includes a hinge mechanism having a pivot axis that

corresponds approximately to the joint axis of the main big toe joint in the direction of flexion and extension.

The Wilms Patent does not teach or suggest a flexible splint with a hinge having a pivot axis that corresponds approximately to the joint axis of the main big toe joint in the direction of flexion and extension. The Office Action incorrectly states that the Wilms Patent teaches a hinge 16 with an axis corresponding approximately to the joint of the main big toe. Element 16 of the Wilms Patent is not a hinge, but a rivet for connecting a pad to a splint (lines 88-93). The rivet 16' is at a pivot position, where the splint portion 12 is pivotally connected to the underfoot plate 25. However, the pivotal connection of the splint 12 and the underfoot plate 25 at rivet 16' is not the same as Applicants' recited hinge mechanism, particularly as this connection in the Wilms Patent is not at, or intended to be at, the joint of the big toe. Therefore, the Wilms Patent does not teach all claim limitations, and this anticipation rejection should be withdrawn.

Regarding new Claim 52, the Wilms Patent also does not teach or suggest the interlocking splint hinge ends recited in Claim 52.

Claim Rejections - 35 U.S.C. §103

The rejection of Claims 48 and 50 under 35 U.S.C. §103(a) as being unpatentable over Wilms, U.S. Patent 1,213,786, is respectfully traversed. Claims 48 and 50 depend from amended Claim 1, and are thus patentable for at least the same reasons discussed above.

The rejection of Claims 27 and 28 under 35 U.S.C. §103(a) as being unpatentable over Wilms, U.S. Patent 1,213,786, in view of Scholl, U.S. Patent 1,055,810, is respectfully traversed. Claims 27 and 28 depend from amended Claim 1, and are thus patentable for at least the same reasons discussed above. The Scholl Patent also does not teach or suggest a hinge mechanism having a pivot axis that corresponds approximately to the joint axis of the main big toe joint in the direction of flexion and extension. Both prior art references teach rigid single-piece splints.

The rejection of Claims 22, 34-36, and 38-46 under 35 U.S.C. §103(a) as being unpatentable over Wilms, U.S. Patent 1,213,786, in view of Tyrrell, U.S. Patent 6,254,559, is respectfully traversed. Claims 22, 34-36, and 38-46 depend from amended Claim 1, and are thus patentable for at least the same reasons discussed above.

Furthermore the Tyrrell Patent is related to a hip joint assembly, and one of ordinary skill in the art would have recognized that hip joints are not simply applicable to orthopedic device for toes. In this particular hip joint, the dimensions would make it practically unusable in a device for fixing at the foot and treating conditions such as hallux valgus. The pivot bearing of the Tyrrell Patent would not, when worn, fit into a shoe. Thus one skilled in the art would not have looked to this brace to apply to the Wilms device.

The alleged combination of the Wilms Patent and the Tyrrell Patent does not provide or suggest Applicants' invention of Claim 22. The Tyrrell Patent does not provide a hinge where splint shank ends near the hinge mechanism are formed so as to correspond to each other in such a way that the hinge end of one of the hinged splint shanks can be inserted into the hinge end of another of the hinged split shanks and interlock. In the Tyrrell Patent, the hinge ends are separated by multiple elements, such as elements 9, 18, 19, 11, and/or 27.

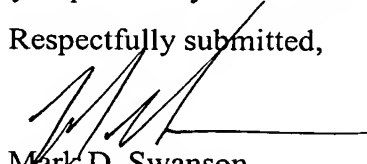
Conclusion

Applicants intend to be fully responsive to the outstanding Office Action. If the Examiner detects any issue which the Examiner believes Applicants have not addressed or resolved in this response, Applicants' undersigned attorney requests a telephone interview with the Examiner.

Serial No. 10/525,852

Applicants sincerely believe that this Patent Application is now in condition for allowance and, thus, respectfully request early allowance.

Respectfully submitted,

A handwritten signature in black ink, appearing to be 'M. Swanson', written over a horizontal line.

Mark D. Swanson

Regis. No. 48,498

Pauley Petersen & Erickson
2800 West Higgins Road
Suite 365
Hoffman Estates, Illinois 60169
(847) 490-1400
FAX (847) 490-1403